Analysis of Factors Affecting Employee Productivity (Study on the Employee of PT Arkan Teknik Medan)

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ABSTRACT

The purpose of this study is to determine the effect of compensation on work productivity, to determine the effect of the work environment on work productivity and to determine the effect of compensation and work environment on work productivity at PT. Arkan Field Engineering. The sampling technique in this study used saturated sampling. namely the determination of a sample of 48 respondents who are employees of the production department at PT Arkan Teknik Medan. This research method was collected through questionnaires that were processed and analyzed using data analysis and Multiple Regression. Then conducting a data quality test used is a validity test using Corrected Item Total and a reability test using Cronbach Alpha to test the hypothesis in this study. Researchers use the t test, and the F test and conduct a determination test. The results of this study showed that there was a significant positive influence of compensation variables on work productivity variables indicated by counting (4,520) > ttabel (1.68) with a significance value of 0.000< 0.05, and there was a significant positive influence of work environment variables on work productivity variables shown by counting (3.713) > ttabel (1.68) with a significance value of 0.001< 0.05, and for compensation and a positive work environment and significant work productivity of employees at PT Arkan Teknik Medan with a calculated value (109,040) > Ftabel (3.19) with a signification rate of 0.000. Furthermore, the R Square value obtained was 0.829 indicating about 82.9% significant influence of compensation and working environment.

Keywords *: Compensation, work environment and productivity.*

INTRODUCTION

In today's business world, the development of industry and domestic and international competition is a motivation for all types of companies in following the development of the business world of manufacturing companies, it is important to innovate and maintain the quality and quality of the products produced. Along with innovating and maintaining product quality, it is also important for companies to increase company productivity through compensation of various forms of service repayment and provide a work environment that can later attract and motivate employees to work productively.

Conductivity in general is a comparison between the work achieved and the overall resources produced. Work productivity is expressed by people by showing the ratio of output to input. Wibowo (2010: 241), work productivity is the relationship between the outputs or results of the organization and the inputs needed. In his book Sedarmayanti (2011: 214), states The factors that influence the high and low work productivity are: Income level and work environment. An employee works is to get the results he wants to get, namely in the form of rewards or wages to meet his living needs, many factors that affect the provision of compensation to employees and also what types of compensation a company provides. As for the company itself, the salary/ reward given to employees is to serve as a guarantee of the continuity of the company's production.

Compensation is something that employees receive in lieu of their service contributions

to the company. Compensation is one of the implementation of the Human Resources function which relates to all types of individual awards as an exchange for carrying out organizational tasks. This is emphasized by Hasibuan (2012: 118) who states that the better compensation will encourage employees to work better and more productively. In addition to compensation, a factor that can affect the level of productivity is the work environment. The work environment according to Nitisemito (2012: 102) is something that exists around workers and can influence themselves in carrying out the tasks charged. Compensation and work environment are important components that exist in the company, to be a benchmark or determination in the achievement of employee work productivity in a company. Pt. Arkan Teknik which is engaged in the electrical wiring industry located on Jalan KL. Yos Sudarso No. 12A, This company is engaged in electrical service activities that produce cables.

Based on the observations made, the problems that occur in the company related to work productivity that occur can be seen from the results of employee work that have not been optimally maximized effectively in carrying out work can be seen in the delay in the production process on the product, resulting in a buildup of work. In terms of compensation, there is a compensation policy that is not fully in line with employee expectations because there are still deductions in benefits and deductions from employee salaries. The work environment is also not effective there is a gap between fellow employees and between employees and superiors which has an effect on work productivity, the existence of this gap makes employees less compliant with existing regulations in the company such as often employees do not come on weekdays so that the company makes a 10% reduction in employee income.

LITERATURE REVIEW
Productivity

Productivity as an "output ratio" compared to "physical input". This is usually associated with industries as a whole in sectors in an economy. According to Hasibuan (2012:126) Productivity is the comparison between outputs (results) and inputs (inputs). If productivity rises this is only possible by an increase in efficiency (time-material-labor) and work system, production techniques and an increase in the skills of the workforce. According to Sunyoto Danang (2012: 203) Work productivity is a measure that shows the consideration between inputs and outputs issued by the company and the role of labor that the unity of time has.

Compensation

Compensation relates to consistent Compensation is everything that is received by workers in return for their work. Internal and consistently external problems. Internal consistency relates to the concept of relative payroll in the organization. While external consistency relates to the level of payroll structure in the organization compared to the payroll structure that prevails outside the organization. The balance between internal consistency and external consistency is considered important to pay attention to in order to be a feeling of satisfaction and the workers remain motivated and effective for the organization as a whole. Compensation carries a broader meaning than wages or salaries.

Work Environtment

In a company, the work environment plays an important role in creating a good work

productivity. This is because every worker gets the right to feel comfortable in their workspace. When employees feel comfortable, the employees are ready to carry out the work given by the company. According to Sadarmayanti (2011: 31) A non-physical work environment is all circumstances that occur related to work relationships, both relationships with superiors and relationships with fellow colleagues, or relationships with subordinates. This non-physical environment is also a working environment group that cannot be ignored.

METHODS

In this study, an associative approach was used, the associative data approach was used because it used three variables, and aimed to analyze the problem of the relationship of a variable with other variables, and the method used in the study used quantitative research. The sampling technique in this study used saturated sampling. namely the determination of a sample by chance of 48 respondents who were employees of the production department at PT. Arkan Teknik Medan. This research method was collected through questionnaires that were processed and analyzed using data analysis and Multiple Regression. Then conducting a data quality test used is a validity test using Corrected Item Total and a reability test using Cronbach Alpha. To test the hypothesis in this study. Researchers use the t test, and the F test and conduct a determination test.

RESULTS AND DISCUSSION
Result
Normality Test Result

The normality test tests the data of the free variable (X) and the bound variable data (Y) on the resulting regression equation, whether it is normal or abnormally distributed. Normality testing is performed with a normal probability plot test. Regression satisfies the assumption of normality if the data spreads around the diagonal line and follows the direction of the diagonal line or its histogram graph shows a normal distribution pattern. The results of the normality test using the SPSS 23 program are as follows:
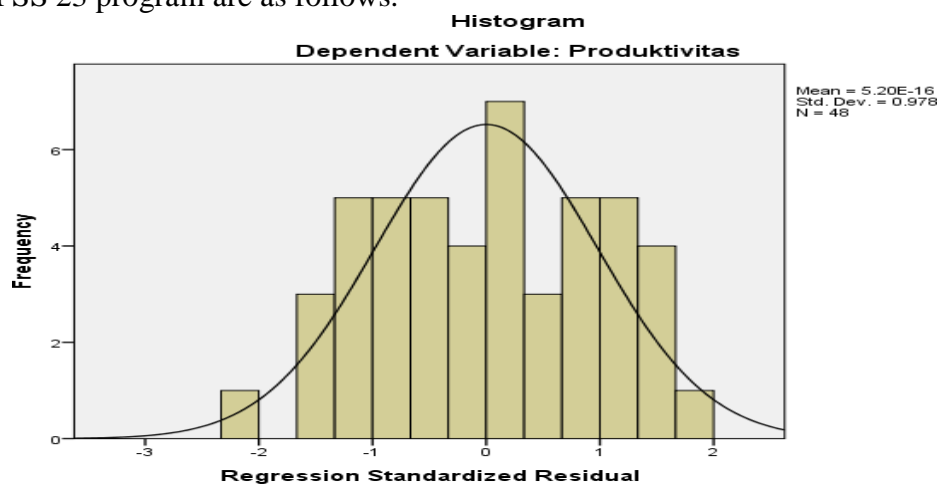

Figure 1. Histogram Chart

Based on the appearance of the figure above, it can be seen that the histogram graph shows a good picture of data patterns. Dependent curves and regression standardized residuals form a bell-like image and follow the direction of diagonal lines thus meeting the assumption of normality.
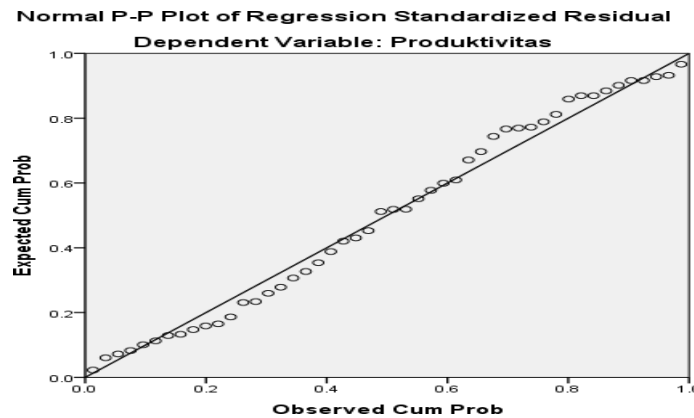

Figure 2. Research using P-Plot

Based on the graph figure 2 normal probability plot above, it can be seen that the data picture shows a good pattern and the data spreads around the diagonal line and follows the direction of the diagonal line, then the normal probability plot graph is distributed normally.

Multicollinearity Test Result

Multicollinearity is where there is no perfect linear relationship between independent variables in the regression model. A good regression model should not have a correlation between independent variables. To determine the presence or absence of symptoms of Multicholinearity by looking at the Variance Inflation Factor (VIF) and Tolerence values, if the VIF value < 10 and tolerance > 0.10, then multicoliniarity does not occur. The results of the multicollinearity test using the SPSS 23 program are as follows:

Table 1. Multicollinierity Test Result

Coefficients[a]

Collinearity Statistics	
Tolerance	VIF
.287	3.486
.287	3.486

In Table 1 the following conclusions can be made:
1. Compensation (X1) with a tolerance value of 0.287 greater than 0.10 and a VIF value of 3.486 smaller than 10.
2. Working Environment (X2) with a tolerance value of 0.287 greater than 0.10 and a VIF value of 3.486 smaller than 10.

Because the tolerance value obtained for each variable > 0.10 and the VIF value obtained for each variable < 10, it means that the data of the compensation variable and the work environment are free from the presence of symptoms of multicholinearity.

Heteroskedasticity Test Result

Heteroskedasticity is a state in which there is a dissimilarity of variants of the residual for all observations on the regression model. The presence or absence of heteroskedasticity can be known by means of a scatterplot graph between the predicted value of an independent variable and its residual value. Test heteroskedasticity with a graph method, namely by looking at the pattern of dots on the regression scatterplot. If, the dots spread out with an unclear pattern and are scattered above and below the number 0 on the Y axis then there is no heteroskedasticity problem. The results of the heteroskedasticity test analysis using a scatterplot chart are shown in the following figure:
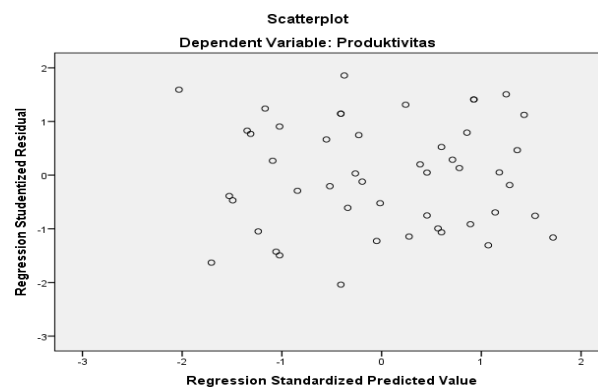

Figure 3. Scatterplot

In figure 3 of the scatterplot chart it can be seen that the results of the scatterplot chart show the data scattered randomly and not forming a specific pattern. The data are scattered both above and below the number 0 on the Y axis.

Multiple Linear Regression

Table 2. Multiple Linier Regression Test Result

Coefficients[a]

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	4.702	2.714		1.732	.090
Kompensasi	.495	.109	.520	4.520	.000
Lingkungan Kerja	.400	.108	.427	3.713	.001

a. Dependent Variable: Produktivitas

Model tersebut menunjukkan arti bahwa:

a. Jika variabel kompensasi dan lingkungan kerja diasumsikan tetap maka produktivitas kerja akan meningkat sebesar 4,702.

b. Nilai koefisien kompensasi sebesar 0,495. Menyatakan bahwa setiap terjadi kenaikan 1 skor untuk kompensasi akan diikuti terjadi kenaikan produktivitas kerja sebesar 0,495.

c. Nilai koefisien Lingkungan kerja menunjukan angka sebesar 0,400. menyatakan bahwa apabila terjadi kenaikan 1 skor untuk lingkungan kerja akan di ikuti dengan terjadi kenaikan produktivitas kerja sebesar 0,400.

Partial Test Result

Partial test (t) shows how far the independent variables individually explain the variation of this test using a significance level of 5%. The t-test is used to test the hypothesis if the researcher analyzes partial regression (an independent variable with a dependent variable). Based on the table above, it can be seen that:

1. The effect of compensation on productivity.

 The results show that significant value of 0.000 <0.05, then Ha is accepted and H0 is rejected, which states that compensation has a significant partial effect on employee productivity.

2. The effect of work environtment on productivity.

 The results show that significant value of 0.001 <0.05, then Ha is accepted and H0 is rejected, which states that work environtment has a significant partial effect on employee productivity.

Simultanous Test Result

The F test (simultaneous test) was conducted to see the effect of the independent variable on the dependent variable simultaneously. The method used is to see the level of significant (= 0.05). If the significance value is less than 0.05, then H0 is rejected and Ha is accepted.

Tabel 3. Simultaneous Test

ANOVAª

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	4.702	2.714		1.732	.090
Kompensasi	.495	.109	.520	4.520	.000
Lingkungan Kerja	.400	.108	.427	3.713	.001

a. Dependent Variable: Produktivitas

b. Predictors: (Constant), Lingkungan Kerja, Kompensasi

From the ANOVA test or F test, the signification value of 0.000 to the significant level previously set is 0.05, then the sig value of 0.000<a 0.05 so that Ho is rejected and Ha is accepted. This shows that simultaneously states that there is a significant effect of compensation and the work environment together on work productivity.

Coefficient of Determination

To find out the amount of compensation contribution and work environment to work productivity simultaneously, it can be known based on the Adjusted R Square value in the table as follows:

Table 4. Coeffisient of Determination Result

Model Summaryᵇ

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.910ª	.829	.821	1.27893	2.166

a. Predictors: (Constant), Lingkungan Kerja, Kompensasi

b. Dependent Variable: Produktivitas

Based on table 4.11 above, it can be seen that the Adjusted R Square value is 0.821 or 82.1%, which means that there is a relationship between compensation and the work environment to work productivity. The table also shows an R Square value of 0.829 or 82.9%, which means the effect of compensation and work environment on work productivity of 82.9%, while the remaining 17.1% of other variables were not studied by this study.

Discussion

From the results of the study, it can be seen that all free variables (compensation and work environment) have a positive coefficient b, meaning that all free variables have a unidirectional influence on variable Y (work productivity). In more detail the results of such analysis and testing can be described as follows:

The Effect of Compensation on the Work Productivity of PT. Arkan Teknik Medan

There was a positive influence of the product quality variable (X1), on the compensation variable (Y) which was shown to be 4,520 > 1.68 with a significance value of 0.000< 0.05. With this kind of relationship, it is contained that the higher / better X1 (Compensation) the higher / good variable Y (Productivity). Then it was also obtained that compensation had a significant effect on work productivity. One of the purposes of providing compensation is to improve the welfare of employees in the company so as to cause effective work productivity. The understanding of compensation for employees can be used as a basis for increasing good work productivity. According to Sunvoto (2012: 92) suggests a good compensation system is a competency system that is able to guarantee employee satisfaction. The higher the compensation given, the higher the satisfaction felt. This is in line with Riansari et al's 2012 research on employees at PT. National Pension Savings Bank. Tbk Malang branch. In the analysis conducted by Riansari using the analysis that there is a significant direct influence between compensation on work productivity.

The Effect of the Work Environment on the Work Productivity of PT. Arkan Teknik Medan

There was a positive influence of the work environment variable (X2), on the work productivity variable (Y) which was shown to be obtained a calculation of 3.713 > 1.68 with a significance value of 0.001< 0.05 then Ho was rejected and Ha was accepted. With this kind of relationship, it is contained that the higher / better X2 (work environment) the higher / good variable Y (work productivity). Then it was also obtained that the work environment has a significant effect on work productivity. The work environment is a condition or condition of the workplace that is equipped with facilities provided by the company in order to get a safe and comfortable atmosphere. When a sense of comfort has occurred in employees, good morale will arise so that employees feel satisfaction at work. This is in line with Handaru's research (2013) which concluded that the work environment affects work productivity.

The effect of compensation and work environment on work productivity at PT. Arkan Teknik Medan

Simultaneous tests showed that the variables of compensation (X1) and work environment (X2) had an effect on the work activity of (Y) PT. ARKAN TEKNIK Medan.

With a calculated F value of 109,040 > Ftabel 3.19 with a signification rate of 0.000. Furthermore, the Adjusted R Square value is 0.821 or 82.1% of the work productivity variable (Y) influenced by compensation (X1) and work environment (X2). So it is also obtained that compensation and the work environment have a significant effect on work productivity. Work productivity is the result of work achieved with all resources produced. Work productivity is expressed by people by showing the ratio of output to input. Wibowo (2010: 241), work productivity is the relationship between the outputs or results of the organization and the inputs needed. Factors that affect the high and low work productivity include compensation and the work environment so that it can be concluded that compensation and work environment affect work productivity. This is in line with the research of Chaisunnah et al (2014) In this study, it was found that compensation and work environment have a significant effect on employee work productivity.

CONCLUSION

Based on the results of research conducted by the author, the author can draw several conclusions.

1. There is a positive influence of the compensation variable (X1), on the work productivity variable (Y) which is indicated by the calculated value (4.520) > ttabel (1.68) with a significance value of 0.000< 0.05 this indicates that partially that there is a significant effect of compensation on work productivity.

2. There is a positive influence of the work environment variable (X2), on the work productivity variable (Y) which is indicated by the calculated value (3.713) > ttabel (1.68) With a significance value of 0.001< 0.05 this indicates that there is a significant influence of the work environment on work productivity.

3. Tests conducted simultaneously showed that the variables of compensation (X1) and work environment (X2) had an effect on work productivity (Y) at PT Arkan Teknik Medan. With a calculated value (109,040) > Ftabel (3.19) with a signification rate of 0.000, with an Adjusted R Square value of 0.821or 82.1% of work productivity variables (Y) influenced by product quality (X1) and brand image (X2). The rest were influenced by other variables that were not studied in the study.

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